CONTROLLING VALVE FOR VARIABLE CAPACITY TYPE COMPRESSOR

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Abstract of **JP 9303607 (A)**

PROBLEM TO BE SOLVED: To improve valve performance by miniaturizing a valve apparatus, while minimizing the hysteresis in relationship between the suction pressure in a suction pressure introducing part and the pressure in a control pressure introducing part and ensuring the sealing between the suction pressure introducing part on the outer periphery of a body, the control pressure introducing part and a discharge pressure introducing part. SOLUTION: When the pressure in a suction pressure introducing part A introduced the inner chamber of a case 2 through a pressure introducing hole 21 is increased, a bellows 8 is contracted to displace a reciprocating shaft 83 to the left side and a spherical valve body 6 for contracting or closing the opening for a valve seat 11a by an energizing force of a leaf spring 7. When the pressure in the suction pressure introducing part A is reduced, the bellows 8 is extended by the internal pressure and the energizing force of a coiled spring 84 to press the spherical valve body 6 through the reciprocating shaft 83, so that the spherical valve body 6 is displaced to expand the opening for the valve seat 11a and introduce a portion of the discharge pressure in the suction pressure introducing part A to the control pressure introducing part B through a communicating path 11. The spherical valve body 6 is always supported by a leaf spring 7 concentrically with the valve seat 11a.